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EXXONMOBIL CHEMICAL COMPANY  
P O BOX 2149  
BAYTOWN, TX 77522-2149

EXAMINER

LANGEL, WAYNE A

ART UNIT PAPER NUMBER

1754

DATE MAILED: 10/31/2003

8

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

924016

Applicant(s)

Janssen et al

Examiner

Langel

Group Art Unit

2754

— The MAILING DATE of this communication appears on the cover sheet beneath the correspondence address —

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, such period shall, by default, expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- ☐ Responsive to communication(s) filed on \_\_\_\_\_
- ☐ This action is **FINAL**.
- ☐ Since this application is in condition for allowance except for formal matters, **prosecution as to the merits is closed** in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

## Disposition of Claims

- ☒ Claim(s) 1-31 is/are pending in the application.
- Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- ☒ Claim(s) 1-31 is/are rejected.
- ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- ☐ Claim(s) \_\_\_\_\_ are subject to restriction or election requirement

## Application Papers

- ☐ The proposed drawing correction, filed on \_\_\_\_\_ is ☐ approved ☐ disapproved.
- ☐ The drawing(s) filed on \_\_\_\_\_ is/are objected to by the Examiner
- ☐ The specification is objected to by the Examiner.
- ☐ The oath or declaration is objected to by the Examiner.

## Priority under 35 U.S.C. § 119 (a)-(d)

- ☐ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119 (a)-(d).
- ☐ All ☐ Some\* ☐ None of the:
  - ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_
  - ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a))

\*Certified copies not received: \_\_\_\_\_

## Attachment(s)

- ☒ Information Disclosure Statement(s), PTO-1449, Paper No(s) 2, 5 and 6 ☐ Interview Summary, PTO-413
- ☒ Notice of Reference(s) Cited, PTO-892 ☐ Notice of Informal Patent Application, PTO-152
- ☐ Notice of Draftsperson's Patent Drawing Review, PTO-948 ☐ Other \_\_\_\_\_

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The following is a quotation of the appropriate paragraphs of 35 U.S.C. § 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

The following is a quotation of 35 U.S.C. § 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-31 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over WO 98/15496. WO 98/15496 discloses a microporous crystalline silicoaluminophosphate composition, wherein the composition is prepared by combining at least one portion of an aluminum source and a phosphorus source with water, a silicon source and an organic template material, and treating the mixture by heating in an autoclave at a temperature of 180 to 260°C for at least one hour. (See the Abstract and the paragraph bridging

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pages 4 and 5.) The silicoaluminophosphate composition prepared according to the process of WO 98/15496 would inherently possess the properties as recited in applicant's claims, since the first full paragraph on page 9 of applicant's specification is evidence that silicoaluminophosphates prepared by submitting a mixture comprising a reactive source of silicon, a reactive source of aluminum and a reactive source of phosphorus, in the presence of an organic structure directing agent (template) to hydrothermal treatment under autogenous pressure, will possess the properties as recited in applicant's claims. Regarding claims 16-23, WO 98/15496 discloses in the Abstract that the silicoaluminophosphate compositions may be used as catalysts for the production of olefins from methanol.

Claims 17 and 18 are rejected under 35 U.S.C. § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. The term "selected from . . ." is improper Markush terminology. The phrase should be changed to "--selected from the group consisting of--" to avoid this rejection.

Claims 1-31 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Mueller et al. Mueller et al. disclose a method for preparing silicoaluminophosphates under hydrothermal conditions

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using 1,2-bis-(4-pyridyl)-ethane as the organic template for the crystallization. (See column 1, line 51 - column 4, line 43.) It would be expected that the silicoaluminophosphate composition prepared according to the process of Mueller et al. would possess the characteristics as recited in applicant's claims, since applicant's specification provides evidence on page 9 that a silicoaluminophosphate composition possessing the characteristics as recited in applicant's claims is formed when subjecting a mixture comprising a reactive source of silicon, a reactive source of aluminum and a reactive source of phosphorus to hydrothermal treatment under autogenous pressure and in the presence of an organic structure directing agent (template). Regarding claims 16-23, Mueller et al. disclose at column 3, lines 39-46 that the silicoaluminophosphate prepared according to the invention can be employed as a catalyst for the conversion of methanol into olefins.

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(e) The invention was described in (1) an application for patent, published under Section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have

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the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1-15 and 24-31 are rejected under 35 U.S.C. 102(e) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Strohmaier et al. Strohmaier et al. disclose a method for producing silicoaluminophosphates by hydrothermally treating under autogenous pressure a mixture comprising a reactive source of silicon, a reactive source of aluminum and a reactive source of phosphorus, in the presence of an organic structure directing agent. (See column 14, line 12 - column 15, line 17.) Strohmaier et al. teach at column 6, lines 12-15 that the template may be di-n-propylamine or diisopropylamine. The silicoaluminophosphates produced according to the process of Strohmaier et al. would inherently possess the properties as recited in applicant's claims 1-15 and 24-31, since page 9 of applicant's specification provides evidence that hydrothermally treating a mixture comprising a reactive source of silicon, a reactive source of aluminum and a reactive source of phosphorus under autogenous pressure will form a silicoaluminophosphate having the characteristics as recited in applicant's claims, when employing dipropylamine as the organic structure directing agent, or template.

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Claims 1-23 are rejected under 35 U.S.C. § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. It is indefinite as to what would constitute "molecular sieves having AEI and CHA framework 'types'". In other words, the word "types" renders the scope of the claims vague and indefinite.

Mertens et al. is made of record for disclosing a method for synthesizing silicoaluminophosphate molecular sieves.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Wayne A. Langel whose telephone number is (703) 308-0248. The examiner can normally be reached on Monday through Friday from 8 A.M. to 3:30 P.M.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Stanley Silverman, can be reached on (703) 308-3837. The fax phone number for this Group is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Group receptionist whose telephone number is (703) 308-2351.

WAL:cdc

October 29, 2003

*Wayne A. Langel*  
WAYNE A. LANGEL  
PRIMARY EXAMINER